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DAUBERSIES, PIERRE

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Ile Gln Glu Asn Thr Ile Thr Asn Asp Thr Ile Glu Glu Lys Leu Glu
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Asn Ile  Glu Asn Met Lys Glu  Gly Leu Leu Asn Lys  Leu Glu Asn
    1055                1060                1065

att tca  agt act gaa ggt gtt  caa gaa act gta act  gaa cat gta      3249
Ile Ser  Ser Thr Glu Gly Val  Gln Glu Thr Val Thr  Glu His Val
    1070                1075                1080

gaa caa  aat gta tat gtg gat  gtt gat gtt cct gct  atg aaa gat      3294
Glu Gln  Asn Val Tyr Val Asp  Val Asp Val Pro Ala  Met Lys Asp
    1085                1090                1095

caa ttt  tta gga ata tta aat  gag gca gga ggg ttg  aaa gaa atg      3339
Gln Phe  Leu Gly Ile Leu Asn  Glu Ala Gly Gly Leu  Lys Glu Met
    1100                1105                1110

ttt ttt  aat ttg gaa gat gta  ttt aaa agt gaa agt  gat gta att      3384
Phe Phe  Asn Leu Glu Asp Val  Phe Lys Ser Glu Ser  Asp Val Ile
    1115                1120                1125

act gta  gaa gaa att aag gat  gaa ccg gtt caa aaa  gag gta gaa      3429
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Thr Val  Glu Glu Ile Lys Asp  Glu Pro Val Gln Lys  Glu Val Glu
    1130                1135                1140

aaa gaa  act gtt agt att att  gaa gaa atg gaa gaa  aat att gta      3474
Lys Glu  Thr Val Ser Ile Ile  Glu Glu Met Glu Glu  Asn Ile Val
    1145                1150                1155

gat gta  tta gag gaa gaa aaa  gaa gat tta aca gac  aag atg ata      3519
Asp Val  Leu Glu Glu Glu Lys  Glu Asp Leu Thr Asp  Lys Met Ile
    1160                1165                1170

gat gca  gta gaa gaa tcc ata  gaa ata tct tca gat  tct aaa gaa      3564
Asp Ala  Val Glu Glu Ser Ile  Glu Ile Ser Ser Asp  Ser Lys Glu
    1175                1180                1185

gaa act  gaa tct att aaa gat  aaa gaa aaa gat gtt  tca cta gtt      3609
Glu Thr  Glu Ser Ile Lys Asp  Lys Glu Lys Asp Val  Ser Leu Val
    1190                1195                1200

gtt gaa  gaa gtt caa gac aat  gat atg gat gaa agt  gtt gag aaa      3654
Val Glu  Glu Val Gln Asp Asn  Asp Met Asp Glu Ser  Val Glu Lys
    1205                1210                1215

gtt tta  gaa ttg aaa aat atg  gaa gag gag tta atg  aag gat gct      3699
Val Leu  Glu Leu Lys Asn Met  Glu Glu Glu Leu Met  Lys Asp Ala
    1220                1225                1230

gtt gaa  ata aat gac att act  agc aaa ctt att gaa  gaa act caa      3744
Val Glu  Ile Asn Asp Ile Thr  Ser Lys Leu Ile Glu  Glu Thr Gln
    1235                1240                1245

gag tta  aat gaa gta gaa gca  gat tta ata aaa gat  atg gaa aaa      3789
Glu Leu  Asn Glu Val Glu Ala  Asp Leu Ile Lys Asp  Met Glu Lys
    1250                1255                1260

tta aaa  gaa tta gaa aaa gca  tta tca gaa gat tct  aaa gaa ata      3834
Leu Lys  Glu Leu Glu Lys Ala  Leu Ser Glu Asp Ser  Lys Glu Ile
    1265                1270                1275

ata gat  gca aaa gat gat aca  tta gaa aaa gtt att  gaa gag gaa      3879
Ile Asp  Ala Lys Asp Asp Thr  Leu Glu Lys Val Ile  Glu Glu Glu
    1280                1285                1290

cat gat  ata acg acg acg ttg  gat gaa gtt gta gaa  tta aaa gat      3924
His Asp  Ile Thr Thr Thr Leu  Asp Glu Val Val Glu  Leu Lys Asp
    1295                1300                1305

gtc gaa  gaa gac aag atc gaa  aaa gta tct gat tta  aaa gat ctt      3969
Val Glu  Glu Asp Lys Ile Glu  Lys Val Ser Asp Leu  Lys Asp Leu
    1310                1315                1320

gaa gaa  gat ata tta aaa gaa  gta aaa gaa atc aaa  gaa ctt gaa      4014
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Glu Glu  Asp Ile Leu Lys Glu  Val Lys Glu Ile Lys  Glu Leu Glu
    1325                 1330                 1335

agt gaa  att tta gaa gat tat  aaa gaa tta aaa act  att gaa aca      4059
Ser Glu  Ile Leu Glu Asp Tyr  Lys Glu Leu Lys Thr  Ile Glu Thr
    1340                 1345                 1350

gat att  tta gaa gag aaa aaa  gaa ata gaa aaa gat  cat ttt gaa      4104
Asp Ile  Leu Glu Glu Lys Lys  Glu Ile Glu Lys Asp  His Phe Glu
    1355                 1360                 1365

aaa ttc  gaa gaa gaa gct gaa  gaa ata aaa gat ctt  gaa gca gat      4149
Lys Phe  Glu Glu Glu Ala Glu  Glu Ile Lys Asp Leu  Glu Ala Asp
    1370                 1375                 1380

ata tta  aaa gaa gta tct tca  tta gaa gtt gaa gaa  gaa aaa aaa      4194
Ile Leu  Lys Glu Val Ser Ser  Leu Glu Val Glu Glu  Glu Lys Lys
    1385                 1390                 1395

tta gaa  gaa gta cac gaa tta  aaa gaa gag gta gaa  cat ata ata      4239
Leu Glu  Glu Val His Glu Leu  Lys Glu Glu Val Glu  His Ile Ile
    1400                 1405                 1410

agt ggt  gat gcg cat ata aaa  ggt ttg gaa gaa gat  gat tta gaa      4284
Ser Gly  Asp Ala His Ile Lys  Gly Leu Glu Glu Asp  Asp Leu Glu
    1415                 1420                 1425

gaa gta  gat gat tta aaa gga  agt ata tta gac atg  tta aag gga      4329
Glu Val  Asp Asp Leu Lys Gly  Ser Ile Leu Asp Met  Leu Lys Gly
    1430                 1435                 1440

gat atg  gaa tta ggg gat atg  gat aag gaa agt tta  gaa gat gta      4374
Asp Met  Glu Leu Gly Asp Met  Asp Lys Glu Ser Leu  Glu Asp Val
    1445                 1450                 1455

aca aca  aaa ctt gga gaa aga  gtt gaa tcc tta aaa  gat gtt tta      4419
Thr Thr  Lys Leu Gly Glu Arg  Val Glu Ser Leu Lys  Asp Val Leu
    1460                 1465                 1470

tct agt  gca tta ggc atg gat  gaa gaa caa atg aaa  aca aga aaa      4464
Ser Ser  Ala Leu Gly Met Asp  Glu Glu Gln Met Lys  Thr Arg Lys
    1475                 1480                 1485

aaa gct  caa aga cct aag ttg  gaa gaa gta tta tta  aaa gaa gag      4509
Lys Ala  Gln Arg Pro Lys Leu  Glu Glu Val Leu Leu  Lys Glu Glu
    1490                 1495                 1500

gtt aaa  gaa gaa cca aag aaa  aaa ata aca aaa aag  aaa gta agg      4554
Val Lys  Glu Glu Pro Lys Lys  Lys Ile Thr Lys Lys  Lys Val Arg
    1505                 1510                 1515

ttt gat  att aag gat aag gaa  cca aaa gat gaa ata  gta gaa gtt      4599
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Phe Asp  Ile Lys Asp Lys Glu  Pro Lys Asp Glu Ile  Val Glu Val
    1520                 1525                 1530

gaa atg  aaa gat gaa gat ata  gaa gaa gat gta gaa  gaa gat ata      4644
Glu Met  Lys Asp Glu Asp Ile  Glu Glu Asp Val Glu  Glu Asp Ile
    1535                 1540                 1545

gaa gaa  gat ata gaa gaa gat  aaa gtt gaa gat ata  gat gaa gat      4689
Glu Glu  Asp Ile Glu Glu Asp  Lys Val Glu Asp Ile  Asp Glu Asp
    1550                 1555                 1560

ata gat  gaa gat ata ggt gaa  gac aaa gat gaa gtt  ata gat tta      4734
Ile Asp  Glu Asp Ile Gly Glu  Asp Lys Asp Glu Val  Ile Asp Leu
    1565                 1570                 1575

ata gtc  caa aaa gag aaa cgc  att gaa aag gtt aaa  gcg aaa aag      4779
Ile Val  Gln Lys Glu Lys Arg  Ile Glu Lys Val Lys  Ala Lys Lys
    1580                 1585                 1590

aaa aaa  tta gaa aaa aaa gtt  gaa gaa ggt gtt agt  ggt ctt aaa      4824
Lys Lys  Leu Glu Lys Lys Val  Glu Glu Gly Val Ser  Gly Leu Lys
    1595                 1600                 1605

aaa cac  gta gac gaa gta atg  aaa tat gtt caa aaa  att gat aaa      4869
Lys His  Val Asp Glu Val Met  Lys Tyr Val Gln Lys  Ile Asp Lys
    1610                 1615                 1620

gaa gtt  gat aaa gaa gta tct  aaa gct tta gaa tca  aaa aat gat      4914
Glu Val  Asp Lys Glu Val Ser  Lys Ala Leu Glu Ser  Lys Asn Asp
    1625                 1630                 1635

gtt act  aat gtt tta aaa caa  aat caa gat ttt ttt  agt aaa gtt      4959
Val Thr  Asn Val Leu Lys Gln  Asn Gln Asp Phe Phe  Ser Lys Val
    1640                 1645                 1650

aaa aac  ttc gta aaa aaa tat  aaa gta ttt gct gca  cca ttc ata      5004
Lys Asn  Phe Val Lys Lys Tyr  Lys Val Phe Ala Ala  Pro Phe Ile
    1655                 1660                 1665

tct gcc  gtt gca gca ttt gca  tca tat gta gtt ggg  ttc ttt aca      5049
Ser Ala  Val Ala Ala Phe Ala  Ser Tyr Val Val Gly  Phe Phe Thr
    1670                 1675                 1680

ttt tct  tta ttt tca tca tgt  gta aca ata gct tct  tca act tac      5094
Phe Ser  Leu Phe Ser Ser Cys  Val Thr Ile Ala Ser  Ser Thr Tyr
    1685                 1690                 1695

tta tta  tca aaa gtt gac aaa  act ata aat aaa aat  aag gag aga      5139
Leu Leu  Ser Lys Val Asp Lys  Thr Ile Asn Lys Asn  Lys Glu Arg
    1700                 1705                 1710

ccg ttt  tat tca ttt gta ttt  gat atc ttt aag aat  tta aaa cat      5184
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Pro Phe  Tyr Ser Phe Val Phe  Asp Ile Phe Lys Asn  Leu Lys His
    1715                1720                1725

tat tta  caa caa atg aaa gaa  aaa ttt agt aaa gaa  aaa aat aat      5229
Tyr Leu  Gln Gln Met Lys Glu  Lys Phe Ser Lys Glu  Lys Asn Asn
    1730                1735                1740

aat gta  ata gaa gta aca aac  aaa gct gag aaa aaa  ggt aat gta      5274
Asn Val  Ile Glu Val Thr Asn  Lys Ala Glu Lys Lys  Gly Asn Val
    1745                1750                1755

cag gta  aca aat aaa acc gag  aaa aca act aaa gtt  gat aaa aat      5319
Gln Val  Thr Asn Lys Thr Glu  Lys Thr Thr Lys Val  Asp Lys Asn
    1760                1765                1770

aat aaa  gta ccg aaa aaa aga  aga acg caa aaa tca  aaa taa          5361
Asn Lys  Val Pro Lys Lys Arg  Arg Thr Gln Lys Ser  Lys
    1775                1780                1785
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<213> P. falciparum

<400> 3

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Asn Asn Glu Gln Ile Thr Thr Ile Phe Asn Arg Thr Asn Met Asn Pro
            20                  25                  30

Ile Lys Lys Cys His Met Arg Glu Lys Ile Asn Lys Tyr Phe Phe Leu
        35                  40                  45

Ile Lys Ile Leu Thr Cys Thr Ile Leu Ile Trp Ala Val Gln Tyr Asp
    50                  55                  60

Asn Asn Ser Asp Ile Asn Lys Ser Trp Lys Lys Asn Thr Tyr Val Asp
65                  70                  75                  80
```

Lys Lys Leu Asn Lys Leu Phe Asn Arg Ser Leu Gly Glu Ser Gln Val
85 90 95

Asn Gly Glu Leu Ala Ser Glu Glu Val Lys Glu Lys Ile Leu Asp Leu
100 105 110

Leu Glu Glu Gly Asn Thr Leu Thr Glu Ser Val Asp Asp Asn Lys Asn
115 120 125

Leu Glu Glu Ala Glu Asp Ile Lys Glu Asn Ile Leu Leu Ser Asn Ile
130 135 140

Glu Glu Pro Lys Glu Asn Ile Ile Asp Asn Leu Leu Asn Asn Ile Gly
145 150 155 160

Gln Asn Ser Glu Lys Gln Glu Ser Val Ser Glu Asn Val Gln Val Ser
165 170 175

Asp Glu Leu Phe Asn Glu Leu Leu Asn Ser Val Asp Val Asn Gly Glu
180 185 190

Val Lys Glu Asn Ile Leu Glu Glu Ser Gln Val Asn Asp Asp Ile Phe
195 200 205

Asn Ser Leu Val Lys Ser Val Gln Gln Glu Gln Gln His Asn Val Glu
210 215 220

Glu Lys Val Glu Glu Ser Val Glu Glu Asn Asp Glu Glu Ser Val Glu
225 230 235 240

Glu Asn Val Glu Glu Asn Val Glu Glu Asn Asp Asp Gly Ser Val Ala
245 250 255

Ser Ser Val Glu Glu Ser Ile Ala Ser Ser Val Asp Glu Ser Ile Asp
260 265 270

Ser Ser Ile Glu Glu Asn Val Ala Pro Thr Val Glu Glu Ile Val Ala
275 280 285

Pro Ser Val Val Glu Ser Val Ala Pro Ser Val Glu Glu Ser Val Glu
290 295 300

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
305 310 315 320

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
325 330 335

Glu Asn Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile Val Ala
340 345 350

Pro Thr Val Glu Glu Ile Val Ala Pro Ser Val Val Glu Ser Val Ala
355 360 365

Pro Ser Val Glu Glu Ser Val Glu Glu Asn Val Glu Glu Ser Val Ala
370 375 380

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
385 390 395 400

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
405 410 415

Glu Asn Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile Val Ala
420 425 430

Pro Thr Val Glu Glu Ile Val Ala Pro Ser Val Val Glu Ser Val Ala
435 440 445

Pro Ser Val Glu Glu Ser Val Glu Glu Asn Val Glu Glu Ser Val Ala
450 455 460

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
465 470 475 480

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
485 490 495

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
500 505 510

Glu Asn Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile Val Ala
515 520 525

Pro Thr Val Glu Glu Ile Val Ala Pro Ser Val Val Glu Ser Val Ala
530 535 540

Pro Ser Val Glu Glu Ser Val Glu Glu Asn Val Glu Glu Ser Val Ala
545 550 555 560

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
565 570 575

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ile Val Ala
580 585 590

Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile Val Ala
595 600 605

Pro Ser Val Val Glu Ser Val Ala Pro Ser Val Glu Glu Ser Val Glu
610 615 620

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
625 630 635 640

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ile Val Ala
645 650 655

Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile Val Ala
660 665 670

Pro Ser Val Val Glu Ser Val Ala Pro Ser Val Glu Glu Ser Val Glu
675 680 685

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
690 695 700

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
705 710 715 720

Glu Asn Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile Val Ala
725 730 735

Pro Thr Val Glu Glu Ile Val Ala Pro Ser Val Val Glu Ser Val Ala
740 745 750

Pro Ser Val Glu Glu Ser Val Glu Glu Asn Val Glu Glu Ser Val Ala
755 760 765

Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala
770 775 780

Glu Asn Val Glu Glu Ser Val Ala Pro Thr Val Glu Glu Ile Val Ala
785 790 795 800

Pro Ser Val Glu Glu Ser Val Ala Pro Ser Val Glu Glu Ser Val Ala
805 810 815

Glu Asn Val Ala Thr Asn Leu Ser Asp Asn Leu Leu Ser Asn Leu Leu
820 825 830

Gly Gly Ile Glu Thr Glu Glu Ile Lys Asp Ser Ile Leu Asn Glu Ile
835 840 845

Glu Glu Val Lys Glu Asn Val Val Thr Thr Ile Leu Glu Asn Val Glu
850 855 860

Glu Thr Thr Ala Glu Ser Val Thr Thr Phe Ser Asn Ile Leu Glu Glu
865 870 875 880

Ile Gln Glu Asn Thr Ile Thr Asn Asp Thr Ile Glu Glu Lys Leu Glu
885 890 895

Glu Leu His Glu Asn Val Leu Ser Ala Ala Leu Glu Asn Thr Gln Ser
900 905 910

Glu Glu Glu Lys Lys Glu Val Ile Asp Val Ile Glu Glu Val Lys Glu
915 920 925

Glu Val Ala Thr Thr Leu Ile Glu Thr Val Glu Gln Ala Glu Glu Lys
930 935 940

Ser Ala Asn Thr Ile Thr Glu Ile Phe Glu Asn Leu Glu Glu Asn Ala
945 950 955 960

Val Glu Ser Asn Glu Asn Val Ala Glu Asn Leu Glu Lys Leu Asn Glu
965 970 975

Thr Val Phe Asn Thr Val Leu Asp Lys Val Glu Glu Thr Val Glu Ile
980 985 990

Ser Gly Glu Ser Leu Glu Asn Asn Glu Met Asp Lys Ala Phe Phe Ser
995 1000 1005

Glu Ile Phe Asp Asn Val Lys Gly Ile Gln Glu Asn Leu Leu Thr
1010 1015 1020

Gly Met Phe Arg Ser Ile Glu Thr Ser Ile Val Ile Gln Ser Glu
1025 1030 1035

Glu Lys Val Asp Leu Asn Glu Asn Val Val Ser Ser Ile Leu Asp
1040 1045 1050

Asn Ile Glu Asn Met Lys Glu Gly Leu Leu Asn Lys Leu Glu Asn
1055 1060 1065

Ile Ser Ser Thr Glu Gly Val Gln Glu Thr Val Thr Glu His Val
1070 1075 1080

Glu Gln Asn Val Tyr Val Asp Val Asp Val Pro Ala Met Lys Asp
1085 1090 1095

Gln Phe Leu Gly Ile Leu Asn Glu Ala Gly Gly Leu Lys Glu Met
1100 1105 1110

Phe Phe Asn Leu Glu Asp Val Phe Lys Ser Glu Ser Asp Val Ile
1115 1120 1125

Thr Val Glu Glu Ile Lys Asp Glu Pro Val Gln Lys Glu Val Glu
1130 1135 1140

Lys Glu Thr Val Ser Ile Ile Glu Glu Met Glu Glu Asn Ile Val
1145 1150 1155

Asp Val Leu Glu Glu Glu Lys Glu Asp Leu Thr Asp Lys Met Ile
1160 1165 1170

Asp Ala Val Glu Glu Ser Ile Glu Ile Ser Ser Asp Ser Lys Glu
1175 1180 1185

Glu Thr Glu Ser Ile Lys Asp Lys Glu Lys Asp Val Ser Leu Val
1190 1195 1200

Val Glu Glu Val Gln Asp Asn Asp Met Asp Glu Ser Val Glu Lys
1205 1210 1215

Val Leu Glu Leu Lys Asn Met Glu Glu Glu Leu Met Lys Asp Ala
1220 1225 1230

Val Glu Ile Asn Asp Ile Thr Ser Lys Leu Ile Glu Glu Thr Gln
1235 1240 1245

Glu Leu Asn Glu Val Glu Ala Asp Leu Ile Lys Asp Met Glu Lys
1250 1255 1260

Leu Lys Glu Leu Glu Lys Ala Leu Ser Glu Asp Ser Lys Glu Ile
1265 1270 1275

Ile Asp Ala Lys Asp Asp Thr Leu Glu Lys Val Ile Glu Glu Glu
1280 1285 1290

His Asp Ile Thr Thr Thr Leu Asp Glu Val Val Glu Leu Lys Asp
1295 1300 1305

Val Glu Glu Asp Lys Ile Glu Lys Val Ser Asp Leu Lys Asp Leu
1310 1315 1320

Glu Glu Asp Ile Leu Lys Glu Val Lys Glu Ile Lys Glu Leu Glu
1325 1330 1335

Ser Glu Ile Leu Glu Asp Tyr Lys Glu Leu Lys Thr Ile Glu Thr
1340 1345 1350

Asp Ile Leu Glu Glu Lys Lys Glu Ile Glu Lys Asp His Phe Glu
1355 1360 1365

Lys Phe Glu Glu Glu Ala Glu Glu Ile Lys Asp Leu Glu Ala Asp
1370 1375 1380

Ile Leu Lys Glu Val Ser Ser Leu Glu Val Glu Glu Glu Lys Lys
1385 1390 1395

Leu Glu Glu Val His Glu Leu Lys Glu Glu Val Glu His Ile Ile
1400 1405 1410

Ser Gly Asp Ala His Ile Lys Gly Leu Glu Glu Asp Asp Leu Glu
1415 1420 1425

Glu Val Asp Asp Leu Lys Gly Ser Ile Leu Asp Met Leu Lys Gly
1430 1435 1440

Asp Met Glu Leu Gly Asp Met Asp Lys Glu Ser Leu Glu Asp Val
1445 1450 1455

Thr Thr Lys Leu Gly Glu Arg Val Glu Ser Leu Lys Asp Val Leu
1460 1465 1470

Ser Ser Ala Leu Gly Met Asp Glu Glu Gln Met Lys Thr Arg Lys
1475 1480 1485

Lys Ala Gln Arg Pro Lys Leu Glu Glu Val Leu Leu Lys Glu Glu
1490 1495 1500

Val Lys Glu Glu Pro Lys Lys Lys Ile Thr Lys Lys Lys Val Arg
1505 1510 1515

Phe Asp Ile Lys Asp Lys Glu Pro Lys Asp Glu Ile Val Glu Val
1520 1525 1530

Glu Met Lys Asp Glu Asp Ile Glu Glu Asp Val Glu Glu Asp Ile
1535 1540 1545

Glu Glu Asp Ile Glu Glu Asp Lys Val Glu Asp Ile Asp Glu Asp
1550 1555 1560

Ile Asp Glu Asp Ile Gly Glu Asp Lys Asp Glu Val Ile Asp Leu
1565 1570 1575

Ile Val Gln Lys Glu Lys Arg Ile Glu Lys Val Lys Ala Lys Lys
1580 1585 1590

Lys Lys Leu Glu Lys Lys Val Glu Glu Gly Val Ser Gly Leu Lys
1595 1600 1605

Lys His Val Asp Glu Val Met Lys Tyr Val Gln Lys Ile Asp Lys
1610 1615 1620

Glu Val Asp Lys Glu Val Ser Lys Ala Leu Glu Ser Lys Asn Asp
1625 1630 1635

Val Thr Asn Val Leu Lys Gln Asn Gln Asp Phe Phe Ser Lys Val
1640 1645 1650

Lys Asn Phe Val Lys Lys Tyr Lys Val Phe Ala Ala Pro Phe Ile
1655 1660 1665

Ser Ala Val Ala Ala Phe Ala Ser Tyr Val Val Gly Phe Phe Thr
1670 1675 1680

Phe Ser Leu Phe Ser Ser Cys Val Thr Ile Ala Ser Ser Thr Tyr
1685 1690 1695

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Leu Leu  Ser Lys Val Asp Lys  Thr Ile Asn Lys Asn  Lys Glu Arg
    1700                1705                1710

Pro Phe  Tyr Ser Phe Val Phe  Asp Ile Phe Lys Asn  Leu Lys His
    1715                1720                1725

Tyr Leu  Gln Gln Met Lys Glu  Lys Phe Ser Lys Glu  Lys Asn Asn
    1730                1735                1740

Asn Val  Ile Glu Val Thr Asn  Lys Ala Glu Lys Lys  Gly Asn Val
    1745                1750                1755

Gln Val  Thr Asn Lys Thr Glu  Lys Thr Thr Lys Val  Asp Lys Asn
    1760                1765                1770

Asn Lys  Val Pro Lys Lys Arg  Arg Thr Gln Lys Ser  Lys
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<222> (2)..(1891)

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  1               5                  10                  15

gat ata aag gaa aat atc tta tta agt aat ata gaa gaa cca aaa gaa      97
Asp Ile Lys Glu Asn Ile Leu Leu Ser Asn Ile Glu Glu Pro Lys Glu
            20                  25                  30
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aat att att gac aat tta tta aat aat att gga caa aat tca gaa aaa      145
Asn Ile Ile Asp Asn Leu Leu Asn Asn Ile Gly Gln Asn Ser Glu Lys
        35                  40                  45

caa gaa agt gta tca gaa aat gta caa gtc agt gat gaa ctt ttt aat      193
Gln Glu Ser Val Ser Glu Asn Val Gln Val Ser Asp Glu Leu Phe Asn
    50                  55                  60

gaa tta tta aat agt gta gat gtt aat gga gaa gta aaa gaa aat att      241
Glu Leu Leu Asn Ser Val Asp Val Asn Gly Glu Val Lys Glu Asn Ile
65                  70                  75                  80

ttg gag gaa agt caa gtt aat gac gat att ttt aat agt tta gta aaa      289
Leu Glu Glu Ser Gln Val Asn Asp Asp Ile Phe Asn Ser Leu Val Lys
                85                  90                  95

agt gtt caa caa gaa caa caa cac aat gtt gaa gaa aaa gtt gaa gaa      337
Ser Val Gln Gln Glu Gln Gln His Asn Val Glu Glu Lys Val Glu Glu
            100                 105                 110

agt gta gaa gaa aat gac gaa gaa agt gta gaa gaa aat gta gaa gaa      385
Ser Val Glu Glu Asn Asp Glu Glu Ser Val Glu Glu Asn Val Glu Glu
        115                 120                 125

aat gta gaa gaa aat gac gac gga agt gta gcc tca agt gtt gaa gaa      433
Asn Val Glu Glu Asn Asp Asp Gly Ser Val Ala Ser Ser Val Glu Glu
    130                 135                 140

agt ata gct tca agt gtt gat gaa agt ata gat tca agt att gaa gaa      481
Ser Ile Ala Ser Ser Val Asp Glu Ser Ile Asp Ser Ser Ile Glu Glu
145                 150                 155                 160

aat gta gct cca act gtt gaa gaa atc gta gct cca act gtt gaa gaa      529
Asn Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu
                165                 170                 175

att gta gct cca agt gtt gta gaa agt gtg gct cca agt gtt gaa gaa      577
Ile Val Ala Pro Ser Val Val Glu Ser Val Ala Pro Ser Val Glu Glu
            180                 185                 190

agt gta gct cca agt gtt gaa gaa agt gta gct gaa aat gtt gaa gaa      625
Ser Val Ala Pro Ser Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
        195                 200                 205

agt gta gct gaa aat gtt gaa gaa atc gta gct cca agt gtt gaa gaa      673
Ser Val Ala Glu Asn Val Glu Glu Ile Val Ala Pro Ser Val Glu Glu
    210                 215                 220

agt gta gct gaa aat gtt gaa gaa agt gta gct gaa aat gtt gaa gaa      721
Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
225                 230                 235                 240
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agt gta gct gaa aat gtt gaa gaa agt gta gct gaa aat gtt gaa gaa      769
Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
                245                 250                 255

agt gta gct gaa aat gtt gaa gaa atc gta gct cca act gtt gaa gaa      817
Ser Val Ala Glu Asn Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu
            260                 265                 270

agt gta gct cca act gtt gaa gaa att gta gct cca act gtt gaa gaa      865
Ser Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu
        275                 280                 285

agt gta gct cca act gtt gaa gaa att gta gtt cca agt gtt gaa gaa      913
Ser Val Ala Pro Thr Val Glu Glu Ile Val Val Pro Ser Val Glu Glu
    290                 295                 300

agt gta gct cca agt gtt gaa gaa agt gta gct gaa aat gtt gaa gaa      961
Ser Val Ala Pro Ser Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
305                 310                 315                 320

agt gta gct gaa aat gtt gaa gaa agt gta gct gaa aat gtt gaa gaa     1009
Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
                325                 330                 335

agt gta gct gaa aat gtt gaa gaa agt gta gct gaa aat gtt gaa gaa     1057
Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
            340                 345                 350

atc gta gct cca agt gtt gaa gaa atc gta gct cca act gtt gaa gaa     1105
Ile Val Ala Pro Ser Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu
        355                 360                 365

agt gtt gct gaa aac gtt gca aca aat tta tca gac aat ctt tta agt     1153
Ser Val Ala Glu Asn Val Ala Thr Asn Leu Ser Asp Asn Leu Leu Ser
    370                 375                 380

aat tta tta ggt ggt atc gaa act gag gaa ata aag gac agt ata tta     1201
Asn Leu Leu Gly Gly Ile Glu Thr Glu Glu Ile Lys Asp Ser Ile Leu
385                 390                 395                 400

aat gag ata gaa gaa gta aaa gaa aat gta gtc acc aca ata cta gaa     1249
Asn Glu Ile Glu Glu Val Lys Glu Asn Val Val Thr Thr Ile Leu Glu
                405                 410                 415

aaa gta gaa gaa act aca gct gaa agt gta act act ttt agt aat ata     1297
Lys Val Glu Glu Thr Thr Ala Glu Ser Val Thr Thr Phe Ser Asn Ile
            420                 425                 430

tta gag gag ata caa gaa aat act att act aat gat act ata gag gaa     1345
Leu Glu Glu Ile Gln Glu Asn Thr Ile Thr Asn Asp Thr Ile Glu Glu
        435                 440                 445
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aaa tta gaa gaa ctc cac gaa aat gta tta agt gcc gct tta gaa aat      1393
Lys Leu Glu Glu Leu His Glu Asn Val Leu Ser Ala Ala Leu Glu Asn
    450                 455                 460

acc caa agt gaa gag gaa aag aaa gaa gta ata gat gta att gaa gaa      1441
Thr Gln Ser Glu Glu Glu Lys Lys Glu Val Ile Asp Val Ile Glu Glu
465                 470                 475                 480

gta aaa gaa gag gtc gct acc act tta ata gaa act gtg gaa cag gca      1489
Val Lys Glu Glu Val Ala Thr Thr Leu Ile Glu Thr Val Glu Gln Ala
                485                 490                 495

gaa gaa gag agc gaa agt aca att acg gaa ata ttt gaa aat tta gaa      1537
Glu Glu Glu Ser Glu Ser Thr Ile Thr Glu Ile Phe Glu Asn Leu Glu
            500                 505                 510

gaa aat gca gta gaa agt aat gaa aaa gtt gca gag aat tta gag aaa      1585
Glu Asn Ala Val Glu Ser Asn Glu Lys Val Ala Glu Asn Leu Glu Lys
        515                 520                 525


tta aac gaa act gta ttt aat act gta tta gat aaa gta gag gaa aca      1633
Leu Asn Glu Thr Val Phe Asn Thr Val Leu Asp Lys Val Glu Glu Thr
    530                 535                 540

gta gaa att agc gga gaa agt tta gaa aac aat gaa atg gat aaa gca      1681
Val Glu Ile Ser Gly Glu Ser Leu Glu Asn Asn Glu Met Asp Lys Ala
545                 550                 555                 560

ttt ttt agt gaa ata ttt gat aat gta aaa gga ata caa gaa aat tta      1729
Phe Phe Ser Glu Ile Phe Asp Asn Val Lys Gly Ile Gln Glu Asn Leu
                565                 570                 575

tta aca ggt atg ttt cga agt ata gaa acc agt ata gta atc caa tca      1777
Leu Thr Gly Met Phe Arg Ser Ile Glu Thr Ser Ile Val Ile Gln Ser
            580                 585                 590

gaa gaa aag gtt gat ttg aat gaa aat gtg gtt agt tcg att tta gat      1825
Glu Glu Lys Val Asp Leu Asn Glu Asn Val Val Ser Ser Ile Leu Asp
        595                 600                 605

aat ata gaa aat atg aaa gaa ggt tta tta aat aaa tta gaa aat att      1873
Asn Ile Glu Asn Met Lys Glu Gly Leu Leu Asn Lys Leu Glu Asn Ile
    610                 615                 620

tca agt act gaa ggc gaa                                             1891
Ser Ser Thr Glu Gly Glu
625                 630
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<210> 5

<211> 630

<212> PRT

<213> P. falciparum

<400> 5

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Thr Leu Thr Glu Ser Val Asp Asp Asn Lys Asn Leu Glu Glu Ala Glu
1               5                  10                  15

Asp Ile Lys Glu Asn Ile Leu Leu Ser Asn Ile Glu Glu Pro Lys Glu
            20                  25                  30

Asn Ile Ile Asp Asn Leu Leu Asn Asn Ile Gly Gln Asn Ser Glu Lys
        35                  40                  45

Gln Glu Ser Val Ser Glu Asn Val Gln Val Ser Asp Glu Leu Phe Asn
    50                  55                  60

Glu Leu Leu Asn Ser Val Asp Val Asn Gly Glu Val Lys Glu Asn Ile
65                  70                  75                  80

Leu Glu Glu Ser Gln Val Asn Asp Asp Ile Phe Asn Ser Leu Val Lys
                85                  90                  95

Ser Val Gln Gln Glu Gln Gln His Asn Val Glu Glu Lys Val Glu Glu
            100                 105                 110

Ser Val Glu Glu Asn Asp Glu Glu Ser Val Glu Glu Asn Val Glu Glu
        115                 120                 125

Asn Val Glu Glu Asn Asp Asp Gly Ser Val Ala Ser Ser Val Glu Glu
    130                 135                 140

Ser Ile Ala Ser Ser Val Asp Glu Ser Ile Asp Ser Ser Ile Glu Glu
145                 150                 155                 160

Asn Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu
                165                 170                 175
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Ile Val Ala Pro Ser Val Val Glu Ser Val Ala Pro Ser Val Glu Glu
180 185 190

Ser Val Ala Pro Ser Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
195 200 205

Ser Val Ala Glu Asn Val Glu Glu Ile Val Ala Pro Ser Val Glu Glu
210 215 220

Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
225 230 235 240

Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
245 250 255

Ser Val Ala Glu Asn Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu
260 265 270

Ser Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu
275 280 285

Ser Val Ala Pro Thr Val Glu Glu Ile Val Val Pro Ser Val Glu Glu
290 295 300

Ser Val Ala Pro Ser Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
305 310 315 320

Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
325 330 335

Ser Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu
340 345 350

Ile Val Ala Pro Ser Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu
355 360 365

Ser Val Ala Glu Asn Val Ala Thr Asn Leu Ser Asp Asn Leu Leu Ser
370 375 380

Asn Leu Leu Gly Gly Ile Glu Thr Glu Glu Ile Lys Asp Ser Ile Leu
385 390 395 400

Asn Glu Ile Glu Glu Val Lys Glu Asn Val Val Thr Thr Ile Leu Glu
405 410 415

Lys Val Glu Glu Thr Thr Ala Glu Ser Val Thr Thr Phe Ser Asn Ile
420 425 430

Leu Glu Glu Ile Gln Glu Asn Thr Ile Thr Asn Asp Thr Ile Glu Glu
435 440 445

Lys Leu Glu Glu Leu His Glu Asn Val Leu Ser Ala Ala Leu Glu Asn
450 455 460

Thr Gln Ser Glu Glu Glu Lys Lys Glu Val Ile Asp Val Ile Glu Glu
465 470 475 480

Val Lys Glu Glu Val Ala Thr Thr Leu Ile Glu Thr Val Glu Gln Ala
485 490 495

Glu Glu Glu Ser Glu Ser Thr Ile Thr Glu Ile Phe Glu Asn Leu Glu
500 505 510

Glu Asn Ala Val Glu Ser Asn Glu Lys Val Ala Glu Asn Leu Glu Lys
515 520 525

Leu Asn Glu Thr Val Phe Asn Thr Val Leu Asp Lys Val Glu Glu Thr
530 535 540

Val Glu Ile Ser Gly Glu Ser Leu Glu Asn Asn Glu Met Asp Lys Ala
545 550 555 560

Phe Phe Ser Glu Ile Phe Asp Asn Val Lys Gly Ile Gln Glu Asn Leu
565 570 575

Leu Thr Gly Met Phe Arg Ser Ile Glu Thr Ser Ile Val Ile Gln Ser
580 585 590

Glu Glu Lys Val Asp Leu Asn Glu Asn Val Val Ser Ser Ile Leu Asp
595 600 605

Asn Ile Glu Asn Met Lys Glu Gly Leu Leu Asn Lys Leu Glu Asn Ile
610 615 620

Ser Ser Thr Glu Gly Glu
625 630

<210> 6

<211> 28

<212> DNA

<213> Artificial Sequence

<220>

<223> Synthetic DNA

<400> 6
gtgatgaact ttttaatgaa ttattaaa 28

<210> 7

<211> 29

<212> DNA

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<220>

<223> Synthetic DNA

<400> 7
tgttgttctt gttgaacact ttttactaa 29

<210> 8

<211> 25

<212> DNA

<213> Artificial Sequence

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<400> 8
ggtatcgaaa ctgaggaaat aaagg 25

<210> 9

<211> 24

<212> DNA

<213> Artificial Sequence

<220>

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<400> 9
catagcagga acatcaacat ccac 24

<210> 10

<211> 50

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 10

Arg Asp Glu Leu Phe Asn Glu Leu Leu Asn Ser Val Asp Val Asn Gly
1 5 10 15

Glu Val Lys Glu Asn Ile Leu Glu Glu Ser Gln Val Asn Asp Asp Ile
20 25 30

Phe Asn Ser Leu Val Lys Ser Val Gln Gln Glu Gln Gln His Asn Val
35 40 45

Glu Glu
50

<210> 11

<211> 100

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 11

Val Glu Glu Ser Val Glu Glu Asn Asp Glu Glu Ser Val Glu Glu Asn
1 5 10 15

Val Glu Glu Asn Val Glu Asn Asn Asp Asp Gly Ser Val Ala Ser Ser
20 25 30

Val Glu Glu Ser Ile Ala Ser Ser Val Asp Glu Ser Ile Asp Ser Ser
35 40 45

Ile Glu Glu Asn Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr
50 55 60

Val Glu Glu Ile Val Ala Pro Ser Val Val Glu Lys Cys Ala Pro Ser
65 70 75 80

Val Glu Glu Ser Val Ala Pro Ser Val Glu Glu Ser Val Ala Glu Met
85 90 95

Leu Lys Glu Arg
100

<210> 12

<211> 47

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 12

Arg Asp Glu Leu Phe Asn Glu Leu Leu Asn Ser Val Asp Val Asn Gly
1 5 10 15

Glu Val Lys Glu Asn Ile Leu Glu Glu Ser Gln Val Asn Asp Asp Ile
20 25 30

Phe Asn Ser Leu Val Lys Ser Val Gln Gln Glu Gln Gln His Asn
35 40 45

<210> 13

<211> 26

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 13

Asp Glu Leu Phe Asn Glu Leu Leu Asn Ser Val Asp Val Asn Gly Glu
1 5 10 15

Val Lys Glu Asn Ile Leu Glu Glu Ser Gln
20 25

<210> 14

<211> 27

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 14

Leu Glu Glu Ser Gln Val Asn Asp Asp Ile Phe Ser Asn Ser Leu Val
1 5 10 15

Lys Ser Val Gln Gln Glu Gln Gln His Asn Val
20 25

<210> 15

<211> 28

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 15

Val Glu Ser Val Ala Pro Ser Val Glu Glu Ser Val Ala Pro Ser Val
1 5 10 15

Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser Val
20 25

<210> 16

<211> 20

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 16

Leu Leu Ser Asn Ile Glu Glu Pro Lys Glu Asn Ile Ile Asp Asn Leu
1 5 10 15

Leu Asn Asn Ile
20

<210> 17

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 17

Val Glu Glu Ser
1

<210> 18

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 18

Val Glu Glu Asn
1

<210> 19

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 19

Val Glu Glu Ile
1

<210> 20

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 20

Val Ala Pro Ser
1

<210> 21

<211> 56

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 21

Val Glu Glu Lys Val Glu Glu Ser Val Glu Glu Asn Asp Glu Glu Ser
1 5 10 15

Val Glu Glu Asn Val Glu Glu Asn Val Glu Glu Asn Asp Asp Gly Ser
20 25 30

Val Ala Ser Ser Val Glu Glu Ser Ile Ala Ser Ser Val Asp Glu Ser
35 40 45

Ile Asp Ser Ser Ile Glu Glu Asn
50 55

<210> 22

<211> 540

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 22

Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Ser Val Val Glu Ser
1 5 10 15

Val Ala Pro Ser Val Glu Glu Ser Val Glu Glu Asn Val Glu Glu Ser
20 25 30

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
35 40 45

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ile
50 55 60

Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile
65 70 75 80

Val Ala Pro Ser Val Val Glu Ser Val Ala Pro Ser Val Glu Glu Ser
85 90 95

Val Glu Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
100 105 110

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
115 120 125

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ile
130 135 140

Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile
145 150 155 160

Val Ala Pro Ser Val Val Glu Ser Val Ala Pro Ser Val Glu Glu Ser
165 170 175

Val Glu Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
180 185 190

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
195 200 205

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
210 215 220

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ile
225 230 235 240

Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile
245 250 255

Val Ala Pro Ser Val Val Glu Ser Val Ala Pro Ser Val Glu Glu Ser
260 265 270

Val Glu Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
275 280 285

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
290 295 300

Val Ala Glu Asn Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile
305 310 315 320

Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Ser Val Val Glu Ser
325 330 335

Val Ala Pro Ser Val Glu Glu Ser Val Glu Glu Asn Val Glu Glu Ser
340 345 350

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
355 360 365

Val Ala Glu Asn Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile
370 375 380

Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Ser Val Val Glu Ser
385 390 395 400

Val Ala Pro Ser Val Glu Glu Ser Val Glu Glu Asn Val Glu Glu Ser
405 410 415

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
420 425 430

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ile
435 440 445

Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile
450 455 460

Val Ala Pro Ser Val Val Glu Ser Val Ala Pro Ser Val Glu Glu Ser
465 470 475 480

Val Glu Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
485 490 495

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
500 505 510

Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Ser Val Glu Glu Ser
515 520 525

Val Ala Pro Ser Val Glu Glu Ser Val Ala Glu Asn
530 535 540

<210> 23

<211> 39

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 23

Asp Glu Asp Ile Glu Glu Asp Val Glu Glu Asp Ile Glu Glu Asp Ile
1 5 10 15

Glu Glu Asp Lys Val Glu Asp Ile Asp Glu Asp Ile Asp Glu Asp Ile
20 25 30

Gly Glu Asp Lys Asp Glu Val
35

<210> 24

<211> 56

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 24

Val Glu Glu Lys Val Glu Glu Ser Val Glu Glu Asn Asp Glu Glu Ser
1 5 10 15

Val Glu Glu Asn Val Glu Glu Asn Val Glu Glu Asn Asp Asp Gly Ser
20 25 30

Val Ala Ser Ser Val Glu Glu Ser Ile Ala Ser Ser Val Asp Glu Ser
35 40 45

Ile Asp Ser Ser Ile Glu Glu Asn
50 55

<210> 25

<211> 212

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 25

Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ile
1 5 10 15

Val Ala Pro Ser Val Val Glu Ser Val Ala Pro Ser Val Glu Glu Ser
20 25 30

Val Ala Pro Ser Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
35 40 45

Val Ala Glu Asn Val Glu Glu Ile Val Ala Pro Ser Val Glu Glu Ser
50 55 60

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
65 70 75 80

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
85 90 95

Val Ala Glu Asn Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ser
100 105 110

Val Ala Pro Thr Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ser
115 120 125

Val Ala Pro Thr Val Glu Glu Ile Val Val Pro Ser Val Glu Glu Ser
130 135 140

Val Ala Pro Ser Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
145 150 155 160

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ser
165 170 175

Val Ala Glu Asn Val Glu Glu Ser Val Ala Glu Asn Val Glu Glu Ile
180 185 190

Val Ala Pro Ser Val Glu Glu Ile Val Ala Pro Thr Val Glu Glu Ser
195 200 205

Val Ala Glu Asn
210

<210> 26

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 26

Val Val Glu Ser
1

<210> 27

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 27

Val Ala Glu Asn
1

<210> 28

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 28

Val Ala Pro Thr
1

<210> 29

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Synthetic Peptide

<400> 29

Val Val Pro Ser
1